DOCUMENT RESUME

ED 199 726 CS 206 184

AUTHOR Holloway, Dale W.
TITLE Cohesion in English: A Key to the Way Our Culture Thinks?
PUB DATE Mar 81
NOTE 51p.; Paper presented at the Annual Meeting of the Conference on College Composition and Communication (32nd, Dallas, TX, March 26-28, 1981). Not available in paper copy due to marginal legibility of original document.

EDRS PRICE MF01 Plus Postage. PC Not Available from EDRS.
DESCRIPTORS Cognitive Processes; *Cognitive Style; Communication (Thought Transfer); *Communication Problems; *Cultural Context; *Cultural Differences; Discourse Analysis; Higher Education; Language Research; Logic; *Minority Groups; Semantics; *Writing (Composition); Writing Instruction
IDENTIFIERS *Cohesion (Written Composition); Inference

ABSTRACT

Minority cultures develop homogeneous customs, language, and thought patterns that affect the writing of individuals from these cultures. Once a student moves outside this homogeneous environment--for example, from an ethnic ghetto to white, middle class classrooms--ideas that seem to the writer to relate clearly to one another do not seem logical or developed to an "outsider." The outsider is not familiar with the inferential contexts the student takes for granted as understood in the homogeneous environment. Differences in cognitive orientation between some minority cultures and the dominant white culture result in these problems. Basic intellectual capacities for understanding "abstract" concepts are inherent to normal members of any culture, but each culture relates concepts in a different way, and these differences reveal themselves through language. If teachers can better understand how aspects of cohesion in language reflect cultural-specific thought processes, they can better guide minority students to communicate effectively in writing. Many minority college students, because of the cognitive styles predominant within their cultures, write in experiential or associative modes, which rely heavily on cohesive devices reflecting a system of logic unfamiliar to the teacher. Teachers must help these students understand that not everyone shares the same "semantic field" or context, and that cohesion is perceived differently by the writer and the reader. (HTH)

****
* Reproductions supplied by EDRS are the best that can be made *
* from the original document. *
****

U.S. DEPARTMENT OF EDUCATION
NATIONAL INSTITUTE OF EDUCATION
EDUCATIONAL RESOURCES INFORMATION CENTER (ERIC)

X This document has been reproduced as received from the person or organization originating it.

☐ Minor changes have been made to improve reproduction quality.

• Points of view or opinions stated in this document do not necessarily represent official NIE position or policy.

"PERMISSION TO REPRODUCE THIS MATERIAL HAS BEEN GRANTED BY

Dale W. Holloway

TO THE EDUCATIONAL RESOURCES INFORMATION CENTER (ERIC)."

Dale W. Holloway
Lewis & Clark College

ED199726

COHESION IN ENGLISH: A KEY TO THE WAY OUR CULTURE THINKS?

A Japanese student and I were laboring together over a long term paper she had written for a literature class. Her teacher had commented that it contained "good ideas," but that "they didn't seem to hold together." He had had trouble seeing how her insights on the novel she had written about "related to one another." As I tried to explain in one particular spot why she needed to construct a sentence with a "because"-clause in order to make a certain relationship more clear, she burst out: "To you Americans, language is so important!"

Startled, I answered, "Yes, of course --"

She held up her hand. "Pardon me. I meant that as a compliment. You see, in my country, words are not so important, because we assume that we all think the same way about things. Here, you Americans assume that everyone doesn't think the same way, and so you must rely on your language to understand one another." She gestured at the essay we were marking up. "Here I must write my ideas so precisely because no one will understand me if I don't. In my country, I am less of an individual than I am here, because I would assume that everyone thought as I do, and, in a way, I would be right."

This student was, it turned out, excited about American "individualism" and how it affected her use of language. Even though it was a chore to write and rewrite her papers in English, she enjoyed expressing herself verbally to others in the effort to be understood: it was a challenge that she hadn't faced in her home country.

CS206184

BEST AVAILABLE COPY

I appreciated that attitude, but I also recognized that few students who struggle to master a language or dialect that is not their own share that enthusiasm. In many of my classrooms, I've sensed, especially among American minorities, a feeling of despair at mastering the peculiarities of a dialect that they know they must master if they want to achieve success in this society.

A great deal of study has focused in the last fifteen years on such students -- the linguistic characteristics of their own languages or dialects, the social interactions and teaching methods that frustrate their learning processes in schools, and the abstract thinking processes that they must adopt in order to achieve academic success in a white-dominated middle-class environment.

Linguists like William Labov have shown, for example, that Black dialect is not a "deviant" form of Standard American English and that the environment of young Black children is, contrary to earlier beliefs regarding "deprived" children, verbally rich and stimulating.[1] Such research, as well as thoughtful commentaries on and studies of the writing process by educators such as Mina Shaughnessy[2] and Janet Emig[3] have done much to help college teachers understand the problems that occur while students are attempting to write complex ideas in Standard American English.

Shaughnessy successfully turned our attention as teachers away from surface "errors" in syntax to examine the problem-solving techniques Basic Writers use in trying to fulfill writing tasks, and in doing so, she helped us read papers as Attempts to Communicate rather than Papers to be Graded.

But there are still difficulties. For some reason, even if we

manage to overlook the "mechanical" problems on the surface of a paper while we strive to understand the ideas a student is trying to communicate, we often still have problems (or, we assume, they have problems). Ideas often don't follow one another logically. We don't see connections between events that the student seems to see. Whole links in chains of reasoning seem to be left out. We begin harping about "transitions," the use of "examples," and "specifics," and begin to wonder why logical categories and connections that seem so clear to us are so difficult to communicate, especially to our minority students.

I think that the comments of the Japanese student at the beginning of this paper can give us a clue to this problem. She had difficulty "explaining" herself in English, not so much because she was writing a foreign language, but because of her mistaken notions of "obvious" logical connections. Her highly allusive, highly associative way of expressing her understanding of a novel confused and frustrated her American readers. If a fellow Japanese student with an equivalent ability in English had read the paper, however, I suspect that he or she would not have had the problems with it that we Americans did.

We can apply this observation, I think, to our minority students. Recent research has shown that intimacy creates a kind of telegraphed or "restricted" discourse. Commonality of experience means that less needs to be conveyed in words to provide context for the information a speaker wants to convey. This "restricted code" is used in families and among intimate friends, but can it be a mode for an entire, isolated culture? Early research in this area[4] seemed to indicate that people from lower socioeconomic classes operated under a more "restricted mode" of

communication, but recent research seems to disprove the fact that "descriptive powers" are weak among lower class and minority groups.[5] Nevertheless, there <u>are</u> indications that underlying assumptions or "orientations" of various cultures at all socioeconomic levels affect the nature of their descriptions of objects and actions.[6]

These "orientations" can have interesting effects on the grammar as well as the ideas expressed in a language. Sayo Yotsukura, for example, in discussing the "subjectlessness" of many Japanese sentences, describes this grammatical trait as the reflection of a "homogeneous" people:

> . . . Japanese have so many things in common that communication can be made without much verbal expression. We could say that Japan is like one family with all her people as the members. It is possible that Japan's isolated location, as well as the closed-door policy of the Tokugawa government for about three centuries preceding Commodore Perry's visit in 1853, enabled the nation to become so homogeneous that it could be considered a family. . . . Subjectless sentences are simply a product of such homogeneity.[7]

It is not difficult to equate the isolation of a large island in the Pacific with the pockets of isolation in which our American minorities have lived for the last two or three centuries. While they have had contact with the dominant culture throughout American history, their social isolation has been such that linguists now recognize Black English, "pocho" Spanish and various modern native American tongues as active, verifiable dialects or, in the case of native Americans, languages, with specific grammars and modes of discourse of their own. This means that, throughout our nation, and, sadly, most often in the ghettos of our larger cities, the dominant culture has isolated its minorities and forced an intimacy and a "homogeneity" in customs, culture, and language upon many of them.

These communities are often characterized by the low socioeconomic status of their members and a lack of mobility -- two factors that cause a "commonality" of experience, and, as a result, a shared context for speech. While such communities may have helped to create, as Labov suggests, a rich and varied environment for oral narrative, they have also created problems for those members of minorities who try to communicate with those outside of that environment. And that first effort often occurs in school.

Once the child moves outside of his/her environment (for example, into classrooms taught by white, middle-class teachers), he or she begins to find that the rich and colorful language of home isn't adequate for communicating ideas to someone outside of his/her culture. The inferential contexts behind the child's words -- the contexts he or she had always taken for granted -- aren't understood by the "outsiders." To some extent, such a process occurs in all children; as they grow older, they learn to move from wholly egocentric speech, as Piaget pointed out, to that which acknowledges the limitations of the listener and provides sufficient contexts to be understood. But the child from a relatively isolated linguistic community has a double problem -- the contexts that need to be provided for understanding vary drastically, depending upon whether the listener is from within or from outside of his/her community. These contexts, furthermore, aren't really definable. How does one put into words the presuppositions, attitudes, sense of humor, and fears of an entire community when he or she is trying to explain something to an "outsider"?

A new communicative burden is thus placed on the young minority student. In order to be understood, he or she needs to provide the

inferential contexts that were taken for granted within his/her own language community. He or she also needs to provide the connectives explicitly that were present implicitly between ideas that were expressed within his or her community. (That is, if the child even recognizes why he or she is being misunderstood!) If a teacher sees beyond the surface differences in dialect in a minority student's writing or speaking, there are still frequently communication problems. Particularly when the child reaches high school and college and begins writing extensively, he or she is often criticized for not being "clear" or "logical" or "specific" enough. Ideas and episodes that seem to relate clearly to one another to the writer don't seem to relate in the same way to the "non-community" teacher, who may complain that ideas don't seem "logical" or "developed." Such comments are liable to make the minority writer wonder if something is wrong with the way he or she thinks, or, as one native American student said to me, "If I feel as if I'm thinking clearly, why don't others see it that way?"

I would like to suggest that differences in cognitive orientation between some American minority cultures and the dominant white culture result in these kinds of difficulties. Recent research has shown that so-called "disadvantaged" or "primitive" minorities all over the world are capable of producing and understanding the types of concepts we consider "abstract"; in other words, basic intellectual capacities are inherent in all healthy, normal members of any culture. But, based on cultural experience, very often concepts and experiences can be related to one another in different ways. These perceived relationships reveal themselves through language.

It is ironic that, very often, we ascribe the disconnectedness in logic that we see in our foreign students' writing to their different languages, philosophies, or ways of life, but we see the same lack of connections in our minority students' writing as "poor logic." Both types of disconnectedness actually derive from a lack of perceived cohesion in the text that we are reading. In fact, I think that it is in this area of cohesion that a partial solution to our minority students' writing problems lie. If we can better understand how aspects of cohesion in language reflect thought processes, we can better guide our minority students in their efforts to communicate in writing. In other words, if we make explicit some of the kinds of reasoning implicit in problem-solving, we may be providing tools for communicating across cultural boundaries, and such recognitions could be valuable for both our minority and non-minority students.

The question indirectly addressed here is this: are there elements of cohesion that are culturally specific or preferred by specific cultures or sub-cultures? That is, are there cultural differences in the ways that people relate and connect concepts to one another through the use of language? There is, as far as I know, no published research on this subject, but I think a good deal of "circumstantial evidence" can be accumulated to answer these questions. Before we can establish connections between types of cohesion and the thought processes they reflect, however, it will be necessary to answer two preliminary questions:

1. Is there linguistic evidence for a connection between human cognition and the construction of discourse?
2. Is there evidence for variances in cognitive styles among different cultures?

If the answer is "yes" to these two questions, then we can infer that written (and probably spoken) discourse will probably reflect in some way the cognitive styles (and thus the systems of "logic") predominant in a culture. In the last part of this paper, I will discuss how certain cohesive devices may reflect certain types of reasoning and suggest ways to approach the teaching of such devices.

I. Is there linguistic evidence for a connection between human cogntion and the construction of discourse?

The earliest systematic investigations of this question were undertaken by L.S. Vygotsky in the U.S.S.R. in the 1920's and were cut off by his untimely death from tuberculosis in 1934. Suppression of his works in 1936 discouraged his followers from publishing their own research until only recently. Vygotsky stressed the importance of language in the process of concept formation. Asserting that "learning to direct one's own mental processes with the aid of words or signs is an integral part of the process of concept formation," Vygotsky hypothesized that the social interactions of the individual helped to determine "not only the contents but also the method of his thinking."[8] We will examine further investigations by his follower Luria in the discussion of cognitive style, but it is interesting to draw attention to Vygotsky's teatment of "logic," a topic I will also return to later. In arguing against some of Piaget's earlier theories of cognitive development, Vygotsky pointed out that the acquisition of new types of thought (or "logic") vary in different social settings,[9] a recognition that some Western psychologists are finally reporting nearly fifty years later.

In the early years of exploring Chomsky's generative, transformational

grammar in America, linguists sometimes moved outside of the internal logic of Chomsky's system and asked questions about the ways that this grammar might reflect cognitive processes. In 1971, for example, Robin Lakoff tried to explore the series of "inferences" necessary to move from two independent clauses joined by "and" or "but." While she found it possible, in most cases, to give syntactic "rules" to govern grammatical and non-grammatical sentences joined by these words, she also acknowledged that "cultural presuppositions" in sentences like "He eats many apples but still needs to go to the doctor" determine the "grammaticality or "non-grammaticality" of certain utterances.[10]

Such recognitions have forced many linguists and psycholinguists in the last decade to explore more fully the ways in which language seems to reflect cognitive processes. Two such linguists are Ray Jackendoff, who has hypothesized sets of semantic relationships that somewhat paralled syntactic relationships (on a transformational model) which are part of "our innate cognitive endowment,"[11] and George A. Miller, who has proposed an elaborate set of "semantic relationships" among words that relate, in turn, to "primitive concepts" at the cognitive roots of language.[12] Such explorations, I think, are evidence that psycholinguists are looking hard at the "deep structure" of Chomsky's model of language and recognizing that, at bottom, language relates to the mind, and it is time to explore that relationship. Too narrow a focus on syntax has left too many questions about language unanswered. Inevitably, this research beyond syntax also involves moving beyond the boundary of the sentence, because "meanings" are not always confined within single sentence structures.

Interesting research in discourse analysis in America is under way on a number of fronts, but I would like to mention three that relate themselves explicitly to cognitive processes that we can study. Wallace Chafe has formulated theories of semantic processing that involve each individual's underlying structure of human "knowledge"; i.e., whenever a person says (or writes) something, he or she has a semantic background made up of the following resources: "a semantic framework for individual sentences, . . . a semantic inventory,. . . and a set of semantic restraints."[13] These, naturally, would vary from person to person (and, one assumes, from culture to culture). Included in this is the notion of "foregrounding" -- the idea that there are certain "concepts which are in the foreground of the minds of the participants in the discourse -- concepts which are. . . in sharp focus at that point."[14] This recognition involves an understanding of the dynamic interchange between speaker (or writer) and listener (or reader), their shared and unshared knowledge, and the resulting effect on the grammar of the language.

In a further attempt to verify the types of situations and dynamics that affect discourse, Linde and Labov constructed an experiment in 1975 in which participants were asked to describe their apartments.[15] While the researchers hypothesized that a variety of methods could be used to accomplish this task, they were surprised to record that the discourse modes used in this task were remarkably similar, so similar, in fact, that Linde and Labov developed twelve discourse "rules" that governed this particular task. Their conclusions are worth repeating:

> In this presentation we have opened a theoretical perspective which is strikingly different from that of recent grammatical inquiry. It would be possible to take each sentence in our data and analyse

> it into the maximal number of possible predications. We might then erect an abstract and elaborate structure in which each noun phrase, adjective, verb, adverb, or even conjunction was seen as a separate logical predication. But we doubt if such structures, without strong empirical support, can lead us to understand the actual semantics and grammatical operations that govern the language. We hope to clarify the semantics of natural language by distinguishing the cognitive input -- the perceived state of affairs -- from the selection and evaluation procedures imposed by discourse rules. It appears that a very large part of sentence grammar is dependent on and arises from rules of social interaction, social conventions, and abstract discourse processes which we have exemplified here.[16]

Another influential American researcher in discourse theory, W. Kintsch, has done a great deal of exploration in the structure of discourse and its representation in memory in an effort to pinpoint how cogntive processes govern language storage and production. In one such experiment, he (with E.H. Kintsch) tested "sequential recall" (in which subjects heard a story and then told it to someone else, creating a story "chain") using four of Grimm's fairy tales and four Alaskan Indian stories.[17] Kintsch predicted that persons would carry "schemas" for culturally characteristic modes of discourse in their minds which would aid in the comprehension and recall of discourse. When they had no such schema for a "foreign" piece of discourse, Kintsch predicted, comprehension and memory would be impaired. The researchers used the sequential recall test on American subjects with the Grimm's tales and the Indian stories and reported their results:

> Recall of the schema-conforming fairy tales was highly accurate across a five-person chain, whereas gross distortions and omissions occurred in the recall of the Indian myths. This suggests that the ability to comprehend and remember a text is facilitated by the availability of an appropriate schema and that the story schema is culture specific.[18]

The findings of the investigators mentioned above point conclusively to what would seem intuitively clear: that particular cognitive processes govern the way in which discourse is constructed. In other words, our

current knowledge at any given moment, a given situation and its demands, and the cultural presuppositions (or "schemas") undergirding our ways of life, all govern the ways in which we use language at any particular time.

II. Is there evidence for variances in cognitive styles among different cultures?

Whenever theorists begin arguing that people from different cultures may "think differently," modern anthropologists and linguists are quick to cry "Whorfism." They disparage the examples which Benjamin Lee Whorf used overenthusiastically in the 1930's when he analyzed turns of phrase and lexical items in American Indian languages to prove that they "dissected nature" in ways different from us.[19] In order to test Whorf's "linguistic relativity" hypothesis, scientists have in recent years actually tested the perceptions of people from different cultures and language families in order to see if they do indeed perceive the world differently from one another.[20] Such testing seems to refute much of Whorf's theory: subjects from different cultures do "see" colors, shapes, and other phenomena similarly, even though their language handles those concepts differently. But this research also shows that there are "preferred" attitudes toward certain concepts and problem-solving, or, as one researcher phrases it, ". . . the structure of connotative meaning is the same from culture to culture, while the connotative meanings of particular concepts are culture-specific."[21] In their effort to find "linguistic universals," linguists seem eager at this point to discount possibilities of such differences in concept and language, but we teachers should be aware that they exist.

Whorf addressed an important question for learning when he discussed

what he considered to be a misconception, the notion of "natural logic":

> Thought, in this view, does not depend on grammar but on laws of logic or reason which are supposed to be the same for all observors of the universe -- to represent a rationale in the universe that can be "found" independently by all intelligent observors, whether they speak Chinese or Choctaw.[22]

In a sense, it is this kind of "natural logic" which Piaget seems to espouse: he asserts that all normal humans develop through predictable stages of cognitive development until they reach, in late adolescence, the stage of "formal operations." Such developmental stages, he implies, are universal, and result in the acquisition of "inferential logic" in the adult, no matter what his/her cultural or lingistic background is. Whorf, on the other hand, would probably argue that no such "natural logic" exists -- that the "inferential" mode of thought described by Piaget is the predominant mode of thought in an industrialized, Western culture, and that it is probably not universal to all cultures.

There is some evidence to refute, at any rate, the inevitability of logical development that Piaget describes. John H. Flavell, one of the foremost interpreters of Piaget in this country, has called into question the idea that a person moves automatically from stage to stage if no situations present themselves which might utilize a higher level of thinking to master. And, more importantly, he questions the idea that people know instinctively when to use a particular cognitive skill if they have not been taught when to use it.[23] Recent studies have also shown that attainment levels of "operational ability," which should, according to Piaget, occur in late adolescence, are highly dependent upon the education and sex of the individual,[24] a strong argument againsta logic that emerges "naturally" in all human beings at the same time.

I have digressed on this issue of cultural relativism and logic for a purpose: to draw a clear distinction between the concepts of "logic" discussed in this paper. If we are to believe Piaget -- that inferential logic is a natural outcome of a developmental process in all persons -- then we run into trouble as teachers when we see college students (supposedly well into the stage of "formal operations") who do not possess inferential logic as we know it. How do we describe these students? Cognitively undeveloped? Retarded intellectually? There are some college programs in this country based on such presuppositions.

Or do we see "logic" as Whorf did -- a relative phenomenon that develops differently in different cultures and in response to different stimuli? While anthropologists have written off the more extreme implications of Whorf's "cultural relativism," many experimental psychologists have been compiling evidence that supports a more "benign" view of his theories. People do seem to approach the world with identifiable "cognitive styles," and some of these styles are more predominant in some cultures than in others. Since these cognitive styles seem to influence the way people categorize experience and go about solving problems, they could (in a "Whorfian" sense) be called systems of "logic."

Recognition of these variances in perception has resulted in an explosion in research over cognitive style in the last ten years; but, once again, these explorations were prefigured by Vygotsky and his colleagues in Russia in the 1930's. Recent publication of research by Vygotsky's former pupil, A.R. Luria, reveals fascinating data from that period concerning cultural differences in thinking among isolated villagers in outlying areas of the U.S.S.R.[25] These people, of Islamic origins,

had been small farmers and virtually illiterate for centuries. After the socialist revolution in the U.S.S.R., the former feudal structure of their culture was dismantled, and the government set up a vast network of schools which finally reached these remote communities and began the effort to integrate the villagers into a socialistic and literate nation. Luria and his team of psychologists arrived shortly afterwards (in 1930), eager to test Vygotsky's cognitive theories on subjects relatively "untainted" by the dominant culture. They set about testing the hypothesis that

> consciousness is the highest form of reflection of reality; it is, moreover, not given in advance, unchanging and passive, but shaped by activity and used by human beings to orient themselves to their environment, not only in adapting to conditions but in restructuring them.[26]

They reasoned that these villagers, whose consciousnesses had been shaped by forces different from the dominant culture, would have different ways of perceiving reality than members of the dominant culture. They also reasoned that those villagers who were being exposed, through schooling, to the dominant culture, might exhibit thinking processes characteristic of both cultures.

The results of Luria's research seem to bear out this hypothesis. His studies show that the illiterate subjects of their testing classified items differently from literate ones,[27] perceived deductive syllogisms differently from literate persons,[28] and used practical rather than theoritical methods in problem-solving.[29] In addition, the illiterate subjects even perceived a set of optical illusions differently from literate subjects, ranging from 29.2% perception of the optical illusions among the least educated peasants, to 75.6% perception among the most educated. (This

means that the non-educated subjects less likely to be misled by optical illusions where, for example, two identical objects are aligned in such a way that one seems larger than the other).[30]

Current research in cognitive style seems to reinforce Luria's results. Donald R. Olson has also investigated thinking processes of literate and non-literate persons and offers some refinements on the concept of "classification" among non-literates.[31] Luria had described his peasants' refusal to accept "generalized" terms for groups of objects, such as tools, preferring to group them instead in terms of their everyday functions. Olson refers to such thinking as "commonsense," as opposed to "literate" thinking, and he hypothesizes that all educated people possess both types. Highly educated cultures usually exhibit predominantly "literate" thinking patterns, while less highly educated cultures, especially those with a rich oral tradition, tend toward the "commonsense" approach to problem-solving. He illustrates a possible outcome when those two types of cultures meet in the arena of education:

> What is called abstraction, for example, reflects largely the mastery of the genus/species structures implicit in all language but made explicit by literate Greeks. Take as a simple example the I.Q. test question: "How are an apple and a peach alike?" If a child responds in terms of the universal and oral coding of experience by saying "They are both to eat," he gets only one point; if, on the other hand, he gives the literate genus/species anwer, namely, "They are both fruit," he gets two points by the test norms. A high I.Q. then reflects, I suggest, a high literate orientation.[32]

Recognizing the effect of cognitive styles on learning and teaching, experimental psychologists have in the past twenty years developed a vast array of cognitive style instruments, designed to characterize subjects' problem-solving techniques, modes of perception, preferred learning styles, etc. Many of these are, no doubt, of questionable design and value,

but there are a few which seem to have provided consistent and verifiable data. One such measurement was developed by H.A. Witkin in the 1940's. The instrument measures "field dependence" versus "field independence," and it has been repeatedly refined and readministered in countless contexts and cultures in the last forty years. The various instruments that have been developed require an individual to pick out an object or design "embedded" on a larger area or picture; or, in some cases, they require an individual to put himself or an object "upright" in a tilted room. Witkin describes the purpose of such tests:

> . . . the common denominator underlying individual differences in performance in these various tasks is the extent to which the person perceives part of a field as discrete from the surrounding field as a whole, rather than embedded in the field; or the extent to which the organization of the prevailing field determines perception of its components; or, to put it in everyday terminology, the extent to which the person perceives analytically.[33]

While results on various "embedded-figures" testing are remarkably consistent, psychologists and educators are still trying to interpret the data on field dependence-independence. They know that people usually progress from highly field dependent children to more field independent adults, but there is relatively little correlation between I.Q. or levels of adult achievement and field dependence or independence. Field dependent people tend to be more socially aware than their counterparts, and they remember faces more accurately. Field independent persons, on the other hand, are less socially aware and tend to have more abstract interests and involvements than field dependents.

Research shows that entire cultures can be classified as predominantly field dependent or independent, and, more to the point here, that most minority groups in this country show preferences for field dependence. One

recent study showed that Mexican-Americans and Blacks from ethnic communities are more field dependent than Anglo-Americans. (Females in all three groups rated as more field dependent).[34] Another study tested groups of Chicano children in "traditional" and "dualistic" communities and found that the children in the traditional (ethnic) community were more field dependent than those in the mixed. Both groups of children, however, became more field independent over a four-year period.[35] Such results have led psychologists to believe that close-knit, socially isolated environments tend to promote field dependence.

What do such categories mean for education? Studies have shown that children at the far ends of the field dependent-independent spectrum seem to learn differently: they assimilate certain types of knowledge more readily than others and respond in different ways to outside reinforcements and stimuli. In addition, teachers tend to respond more favorably to students who match their own cognitive style. Little research has been reported, however, on how this cognitive style affects writing or other communicative skills. Some recent composition research in urban universities (reported informally) has indicated that field dependent writers are judged less skilled than field independent ones. But these studies, I suspect, are riddled with variables: most field dependent subjects tend to belong to low socioeconomic groups and minorities in these studies, whose educational backgrounds, dialects, etc., could also have affected their "effectiveness" in writing. Research at Lewis & Clark College,[36] in fact, on middle- and upper-middle-class white students provided significant correlations between field dependence and overall effectiveness on a specific writing task -- composing a letter to a school

administrator in response to an interview with him in the school newspaper. These results suggest that: (1) it is difficult to assess the specific effects on writing of a particular cognitive style because of social and cultural factors that cluster around that style; and (2) writing effectiveness may be a function of both cognitive style and the demands of the particular writing task.

There are many other types of cognitive style that are currently under study, but I would like to mention just two others here that have provided interesting data in cross-cultural research. One such experiment tested Asian and British subjects in the area of "probabilistic thinking,"[37] not a subject that would occur to one naturally as an object of study. The researchers, G.N. Wright and L.D. Phillips, reported strong differences in such thinking between the two cultures:

> . . . these differences outweigh any influence of sub-culture, religion, occupation, arts/science orientation or sex, at least within the contexts studied. Generally, Asians adopt a less finely differentiated view of uncertainty, both numerically and verbally than do the British. In cases where a numerical probabilistic set is adopted by Asians the probabilities assessed are much more extreme and much less realistic than those assessed by the British. This finding has clear implications for communication of uncertainty across cultures. . .[38]

In another cross-cultural study, A.M. Bentley administered a version of the PATCO (figure recogntion) test to Scottish and Bukusu (African) subjects. Both groups were able to recognize and reproduce a variety of patterns, but the Bukusu subjects saw a broader range of "similarity" between certain patterns. That is, they were more tolerant of a wider range of "sameness" among patterns than the Scottish subjects.[39] Research like this raises disturbing questions for educators in multi-cultural settings. If concepts as subtle as field dependence-independence, probability, and

similarity are known to vary among cultures, what other such cognitive variables influence the communications of our students? How much common ground do we have for the teaching of writing and other communicative skills?

We must recall, first of all, that we are discussing preferred styles of perception and problem-solving. They are probably not genetically determined (we know from Lûia's research-and others-that styles change when exposure to different cultures is increased) and they should not be categorized as cognitive abilities or disabilities. Studies show, for example, that speakers of Black English and Hawaiian "pidgen" dialects have not only complex and sophisticated understandings of the grammar of their own dialect, but also a relatively sophisticated understanding of and comprehension of the Standard American English that they experience in school.[40] They are, in effect, bidialectal in their ability to remember and comprehend stories in their own and in the dominant dialect. Other studies have shown that lower -socioeconomic (SES) black and white and middle-SES white children score the same on "levels of abstraction tasks."[41] In other words, there is sound evidence that certain cognitive capabilities are universal -- we are all capable of abstracting ideas, providing categories for groups of things and perceiving patterns, but we have culturally "preferred" ways of abstracting, categorizing, and relating patterns.

It is difficult to say how much these cultural cognitive preferences influence language, or, as Whorf claimed, how much language in turn influences the perpetuation of a particular cognitive style. Since cognitive styles such as field dependence-independence vary within cultures

using the same language (although whole cultures can be "predominantly" one or the other), language alone is obviously not the "determiner" of one style over another. But, as the first section of this paper showed, there are strong indications that cognitive processes do influence the structure of discourse. It stands to reason, then, that if cognitive styles vary, discourses may also vary in some way that reflects the preferred styles of the persons who produce that discourse.

As I suggested at the outset of this paper, it would be useful to look at cohesion -- how thoughts are joined in a text -- as a possible reflector of cognitive style. Perhaps at some point there may be a way to correlate preferred types of cohesion to results on various cognitive style instruments, but first we will need to have a much clearer idea of the nature of cohesion than linguists have at present.

As teachers, we should be interested in identifying and categorizing elements of cohesion so that we can then help our minority and non-minority students become aware of the broad range of ways our language has for relating thoughts, facts and events to one another. We could then design exercises and activities that would force students to us a variety of cohesive devices to perform certain tasks. If Vygotsky is correct -- that new language tasks can produce new cognitive skills -- as teachers we could help our students perhaps broaden the range of their cognitive styles.

Defining Cohesion

In this section I would like to establish some criteria for the determining of cohesive devices, using the taxonomy of Halliday's and Hasan's Cohesion in English[42] as a framework to categorize and explain

the various types that seem worthy of study. I will also borrow concepts from George A. Millier's[43] and Jerrold Katz's[44] recent discussions of meaning, grammar and the mental lexicon.

Halliday and Hasan describe the quality that links sentences together into meaningful discourse as "cohesion." They divide elements of cohesion into four categories: reference, substitution and ellipsis, conjunction, and lexical cohesion. Because of the syntactic "power" of the sentence, they prefer to discuss cohesion as it exists across sentence boundaries:

> Whereas within the sentence, or any similar unit, we can specify a limited number of possible structures, such as types of modification or subordination, transivity or modal structures and the like, which define the relations among the parts, we cannot in the same way list a set of possible structures for a text, with sentence classes to fill the structural roles. Instead we have to show how sentences, which are structurally independent of one another, may be linked together through particular features of their interpretation; and it is for this that the concept of cohesion is required.[45]

This concept means that a kind of semantic structure of the text is superimposed over the individual syntactic structures of sentences. And the successfulness of the cohesion of the text conforms to how well the semantic structure of the speaker (or writer) is understood by the listener (or reader). For cohesion is perceived in the minds of the <u>receivers</u> of a message, as well as in the senders of that message, as B.L. Nash-Webber explains in a discussion of anaphora:

> The result is a model of comprehension in which the relation of antecedent to anaphor is <u>indirect</u>: the text or non-linguistic environment evokes entities in the language receiver's mind which may be addressed, in turn, anaphorically.[46]

This recognition is important for our understanding of communication across cultural boundaries. If the preferred cohesive devices of one

person's internal "schemata" are highly different from those of another person's, their perception of cohesion (and thus of meaningfulness) in one another's discourse may suffer.

For our purposes here, an evaluation of cohesive devices in expressing ideas in writing, Halliday's and Hasan's classifications are somewhat limited. Simply naming cohesive devices in a piece of discourse is not adequate for judging its effectiveness or the type of thinking processes it reflects. We must therefore devise some means of evaluating the kinds of meaning that certain types of cohesive devices convey. For our purposes too we must question the idea that cohesion exists only across sentence boundaries.

Halliday and Hasan acknowledge that cohesive devices operate within sentences, but because of the basic syntactic structures of sentences, they prefer to avoid confusion of structure and semantics by not considering intra-sentence cohesive devices in their taxonomy. Teachers of writing, however, are acutely aware of the "non-cohesive" individual sentences of their students. We know that understanding of sentences suffers when students choose a "with" instead of a "because" or a "so" instead of an "as a result" to tie together the two halves of a sentence. It is true that such word choices are inextricably bound up with the syntactic properties of a sentence, but they also represent units of meaning that involve proper choices of cohesive devices. Chomsky and other generative linguists have effectively demonstrated, I think, that many of our sentences are built upon other "deep structure" units; how these units are joined to produce understandable complex sentences -- what cohesive devices join them -- involves, at some point, a semantic "choice" of connectors.

We will, therefore, be considering cohesive devices that operate within as well as beyond sentence boundaries in our discussion of cohesion.

The cohesive categories of "reference" and "substitution and ellipsis" that Halliday and Hasan propose are perhaps the simplest and most obvious. Substitution and ellipsis, in fact, come closest to "syntactic" entities, I think, of the four categories, because they involve the simple deletion of or substitution for words or simple concepts, and involve no complex conceptual references in the mind to be understood. Likewise, "reference" involves a relatively lateral movement in thought in order to be understood. We recognize quickly the referent for a "he," "she," or "this" if it exists in the text. Comparitives and superlatives like "more" and "most" are simple quantitative distinctions that are perceived easily. For these reasons, we will limit this discussion to Halliday's and Hasan's categories of "conjunction" and "lexical cohesion," which represent a great range in modes of thought and require a good deal of refinement in order to be evaluated accurately. This discussion will simply suggest some further refinements for these categories in an effort to give teachers of writing a heightened awareness of what textual means are used by writers to express particular modes of thought.

Conjunction, according to Halliday and Hasan, consists of the linking of sentences in a text by words and phrases that have the function "of relating to each other linguistic elements that occur in succession but are not related by other, structural means."[47] Conventional grammar would call such words or groups of words adverbs, adverbial phrases, conjunctions, etc. The underlined words in the following sentences are conjunctive devices:

> The apples looked delicious. Their insides, however, were rotten. In spite of this, Mary ate them hungrily and drank water from the stream. Later, she suffered from a terrible stomach-ache.

Appendix A consists of a general overview of the major categories of conjunction as I see them with examples for illustration.

Lexical cohesion is a bit more difficult to define. Halliday and Hasan describe it simply, as "the cohesive effect achieved by the selection of vocabulary,"[48] but this type of cohesion can be elusive and allusive, and recognition of its nature has, in this country, set semanticists apart from transformationalists. Both Miller[49] and Katz[50] have gone to great lengths to describe the "intentional" nature of the lexicon, and have found it a slippery concept. Many words, they have shown, consist of not only a denotative meaning, but also a connotative meaning determined by our culture, as well as a structural meaning that derives from their usage in discourse. In addition, Halliday and Hasan emphasize, words within similar "semantic fields" (using Miller's term) act as cohesive devices in a text. The underlined words in the following example provide lexical cohesion to the text:

> The Republicans and Democrats have had another contest, and the Republicans, this time, have won. As winners, the GOP can now pick and choose its representatives in the most powerful offices in the land: The Secretary of State, the Secretary of Defense, and, most likely, one or more Supreme Court Justices.

It is quite obvious that our understanding of "Republican" and "GOP" as well as "won" and "winners" helps to cohere these sentences in our mind. Less obvious, but no less cohesive, are the connections of "office" and the titles of "Secretary" and "Justices." Appendix B presents the major categories of lexical cohesion with examples.

Cohesion and Logic

Appendix C presents my analysis of the various logical categories represented by conjunction and lexical cohesion. A brief discussion of each category follows:

1. Experiential -- This type of cohesion links events or observations to other events and observations through perceived implicit connections. Using this mode, for example, newspaper articles during the Vietnam War may have described battles in that Southeast Asian country in one sentence and begun the following sentence next: "At home, 5,000 demonstrators against the war took to the streets of Pittsburgh on Tuesday and held up traffic for three hours." The connections between these events were obvious to most readers: the events in that small nation had become inextricably tied in our minds to the protests at home. The temporal conjunction "on Tuesday" and the collocative "at home" (played off against the previous sentence's "in Vietnam" or something similar) and the "general" item "war" are lexical items that also provide cohesion in our minds for the two sentences.

These types of cohesion represent a lateral movement in thought; i.e., they do not make broader, on the one hand, or more particular, on the other, our understanding of the items joined. They simply indicate that there is a connection between the two events. Narrative and descriptive prose often utilize this cohesive strategy.

2. Associative -- This type of cohesion relies heavily on the implicit connotative meanings in words and events that serve to relate them in our minds. While cause and effect and inductive-deductive chains of reasoning may be working under the surface, associative cohesion doesn't

"spell out" those chains overtly, but through the associations that have accrued around certain words, events, ideas and situations that the text describes. A passage from D.H. Lawrence's Studies in Classic American Literature (New York: the Viking Press, 1961) illustrates this type of cohesion:

> But Poe knew only love, love, love, intense vibrations and heightened consciousness. Drugs, women, self-destruction, but anyhow the prismatic ecstacy of heightened consciousness and sense of love, of flow. the human soul in him was beside itself. But it was not lost. He told us plainly how it was, so that we should know.
>
> He was an adverturer into vaults and cellars and horrible underground passages of the human soul. He sounded the horror and the warning of his own doom. (p. 81)

Some might call this passage "illogical" in conventional terms, but in terms of the associative context that Lawrence has established throughout the book, it does maintain an internal consistency. In the second sentence of the above passage, for instance, Lawrence particularizes "intense vibrations and heightened consciousness" through the use of examples: "Drugs, women, self-destruction," not in any explicit way, but through the connotative associations that surround the words "heightened consciousness," "drugs" and so on. The collocative patterns surrounding the concept of "soul" also tie the passage together: "vibrations. . . self-destruction. . . flow. . . soul. . . beside itself. . . vaults and cellars and horrible underground passages of the human soul. . . horror. . . doom." The sense of a foreboding movement underlies this passage because of such word choices, and that sense becomes a unifying factor in the discourse.

Associative cohesion is probably the most difficult of the categories to do well. Its logical movement is multiple: as the above passage shows, it can move from the general to the specific to the general as well as

in lateral directions, but with few overt indications of movement. The problem with associative writing is thatthe writer must be sure that his/her reader possesses the same connotative, allusive or symbolic associations that he or she does, or communication between the two will break down. When associative cohesion does work well, however, it can creat emotionally powerful prose.

3. Generalizing -- This type of cohesion relies on the linking together of abstract concepts through a variety of means. It is characterized by a lack of specificity and example, and cohesion is often maintained by cause-effect and conditional conjunctive devices as well as lexical items that overlap semantically. An example from Kenneth Burke (from A Grammar of Motives and A Rhetoric of Motives, Cleveland: World Publishing, 1962) illustrates the generalizing category well:

> Men seek for vocabularies that will be faithful reflections of reality. To this end, they must develop vocabularies that are selections of reality. And any selection of reality must, in certain circumstances, function as a deflection of reality. Insofar as the vocabulary meets the needs of reflection, we can say that it has the necessary scope. In its selectivity, it is a reduction. Its scope and reduction become a deflection when the given terminology, or calculus, is not suited to the subject matter which it is designed to calculate. (p. 59)

College professors might call this classically "logical" writing. Here Burke defines abstract terms by the inclusion and exclusion of various other abstract terms. His conjunctive devices ("To this ind. . . And. . . Insofar as. . . we can say. . .") collocations ("reflections. . . selections. . . deflection") and use of synonyms and near-synonyms ("reflections. . . reality. . . selections. . . selection. . . reality. . . deflection. . . reflection," etc.) give the passage a strong sense of

in lateral directions, but with few overt indications of movement. The problem with associative writing is that the writer must be sure that his/her reader possesses the same connotative, allusive or symbolic associations that he or she does, or communication between the two will break down. When associative cohesion does work well, however, it can creat emotionally powerful prose.

3. Generalizing -- This type of cohesion relies on the linking together of abstract concepts through a variety of means. It is characterized by a lack of specificity and example, and cohesion is often maintained by cause-effect and conditional conjunctive devices as well as lexical items that overlap semantically. An example from Kenneth Burke (from A Grammar of Motives and A Rhetoric of Motives, Cleveland: World Publishing, 1962) illustrates the generalizing category well:

> Men seek for vocabularies that will be faithful reflections of reality. To this end, they must develop vocabularies that are selections of reality. And any selection of reality must, in certain circumstances, function as a deflection of reality. Insofar as the vocabulary meets the needs of reflection, we can say that it has the necessary scope. In its selectivity, it is a reduction. Its scope and reduction become a deflection when the given terminology, or calculus, is not suited to the subject matter which it is designed to calculate. (p. 59)

College professors might call this classically "logical" writing. Here Burke defines abstract terms by the inclusion and exclusion of various other abstract terms. His conjunctive devices ("To this ind. . . And. . . Insofar as. . . we can say. . .") collocations ("reflections. . . selections. . . deflection") and use of synonyms and near-synonyms ("reflections. . . reality. . . selections. . . selection. . . reality. . . deflection. . . reflection," etc.) give the passage a strong sense of

overt cohesion. The thought movement here is lateral -- it moves from concept to concept without particularizing at a less abstract level.

This type of writing is relatively common, but it too is particularly hard to do well. A kind of "cognitive fatigue" sets in for the reader when generalized writing, no matter how cohesive, goes on for too long. Perhaps the prolonged use of superordinates (without hyponyms or examples for illustration) weakens the semantic impact of abstract concepts. (It would be interesting to devise an experiment that would test this suggestion.)

4. Inductive -- The cohesive devices used to express inductive thought move, we might say, in an upward direction -- from the particular to the general. The "particular" may refer to a variety of things -- hyponyms, descriptions of events, insights and thoughts -- and the "general" to superordinates, abstract effects, or conclusions.

5. Deductive -- As might be expected, deductive cohesion moves downward in thought from generalization to particulars, and can use a wide variety of conjunctive or lexical means to do so. A passage from Julian Jaynes (in The Origin of Consciousness in the Breakdown of the Bicameral Mind, Houghton-Mifflin: Boston, 1976) illustrates both inductive and deductive types of cohesion:

> Even the more standard types of reasoning can occur without consciousness. A boy, having observed on one or more past occasions that a particular piece of wood floats on a particular pond, will conclude directly in a new instance that another piece of wood will float on another pond. There is no collecting together of past instances in consciousness, and no necessary conscious process whatever when the new piece of wood is seen directly as floating on the new pond. This is sometimes called reasoning from particulars, and is simply expectation based on generalization. (p. 42)

The passage moves associatively from a generalization about the nature of "reasoning without consciousness" to the particular: a boy watching

wood floating in a pond. Words in the second sentence -- "observed. . . concluded" -- correspond associatively to "reasoning" in the first. They tie together the general observation about reasoning and consciousness to the particular instance of the boy and the pond through no overt conjunctive devices, but the movement in thought is not disjointed. The next sentence contains a great deal of lexical cohesion. Words like "collecting together of past instances in consciousness" and "conscious process" refer back through repetition and synonyms to previous abstract discussions of the nature of consciousness, and the mention of "wood" and "pond" also ties that sentence in repetitively with the concrete example that directly precedes it. The following sentence, tied initially through Reference ("This") to the preceding sentence, moves again to the higher, more abstract level of the first sentence as it interprets the particular event. The paragraph thus illustrates a movement from the general to the illustrative specific and back to the general again. In this case, there are no overt conjunctive devices pointing the way through a rather complex type of reasoning, and yet they are not needed. The lexical connections are adequate to that particular task. Another inductive-deductive chain of reasoning might, naturally, require more overt connections (through the use of conjunctive devices) to achieve cohesion.

Applications to Teaching

In setting up this paradigm for cohesion, I seem to have come far afield from the teaching of writing to minority students and the studies of cognition and discourse cited earlier in this paper; but the three subjects do come together. It is my experience that many American minority

students, possibly because of the cognitive styles predominant within their cultures, write in the Experiential or Associative modes, no matter what the writing task, when they enter college. This can present problems in communication because of the heavy reliance on lexical cohesion required by the two modes. The "semantic fields" or "schemata" behind the words chosen to achieve cohesion reflect a logic or frame of reference that is often not shared with the dominant culture. In contrast, white middle-class students usually enter college writing classes chiefly in the Generalizing mode. Even though their "schemata" is probably more compatible with a white, middle-class teacher's, their writing also presents problems. They seem to forget that the same instances and events that correspond in <u>their</u> minds to the abstractions they write don't automatically spring into the mind of the reader of those abstractions, no matter what type of culture he or she comes from.

The teacher in a multi-cultural classroom is thus often confronted by a whole array of writing problems: there are papers full of disconnected experiences and insights with no conclusions that seem to follow, and papers full of disconnected conclusions with no experiences or insights to support them; and somewhere in between are papers full of experiences and conclusions that seem to have no connections whatsoever.

Obviously, our goal in this situation is to teach students to be able to move among <u>all</u> of these modes of expression comfortably and communicatively. I think that one way to do this is by consciously teaching the cohesive devices presented here and by forcing all of our students -- through carefully planned exercises and writing assignments -- to use all of them while experimenting with various modes of discourse.

The goal is to teach them to move comfortably between the particular and the general and to recognize the categories that word choices imply. In the process, our students must learn that cohesion (and thus understanding) is perceived separately by speaker (or writer) and hearer (or reader). Thus, one of the hardest things we must teach to minority and non-minority students alike, is that we do not all share the same "semantic fields" or associations. Ideas that flow naturally from one into the other to me may not relate at all to another person. In recognizing that someone else will be reading what they write, our students should realize that they need to, at times, make explicit to a reader -- through recognized cohesive devices -- what seems implicit in their own thoughts. This holds true for both white and non-white students, because ours is a multi-cultural society, and what my Japanese student recognized about Americans is true. The diversity of our culture demands that we learn to recognize and use a variety of ways to express our thoughts.

An Illustrative Example

William Labov has done much to demythologize the Black dialect and inner city culture. His recordings of speech and language interactions, as well as his critiques of earlier linguistic studies of minority dialects, revolutionized our view of Black dialect and the "disadvantaged" people who used it.

Nevertheless, I have had problems accepting his views about certain examples of "logic" that he found within the inner city in Language in the Inner City. They seem to reflect a misunderstanding of the relationship between certain types of reasoning and the words and constructions necessary to express that reasoning process. We have shown here how cohesive

devices do reflect types of logic when used effectively. But we must also recognize when the mastery of cohesion isn't at the same level as the mastery of a particular mode of thought. Labov considers the logic of his inner-city black subjects clear and effective and, in fact, has little good to say about educated black subjects who do not use the explicit communicative modes of his inner-city contacts. In Chapter 5, he sets up a contrast in expressive modes between an inner-city Black, Larry, and an "upper-middle-class, college-educated black adult," Charles M.[51] Both exchanges are reproduced below:

Larry --

> J.L. . .but, just say that there is a God, what color is he? White or black?
> Larry: Well, if it is a God. . . I wouldn' know what color, I couldn' say, -- couldn' nobody say what color he is or really would be.
> JL: But now, jus' suppose there was a God --
> Larry: Unless'n they say. . .
> JL: No, I was jus' sayin' jus' suppose there is a God, would he be white or black?
> Larry:. . . He'd be white, man.
> JL: Why?
> Larry: Why? I'll tell you why. "Cause the average whitey out here got everything, you dig? And the nigger ain't got shit, y'know? Y'unnerstan'? So -- um -- for -- in order for that to happen, you know it ain't no black God that's doin' that bullshit.[52]

Charles --

> CR: Do you know of anything that someone can do, to have someone who has passed on visit him in a dream?
>
> Charles: Well, I even heard my parents say that there is such a thing as something in dreams, some things like that, and sometimes dreams do come true. I have personally never had a dream come true. I've never dreamt that somebody was dying and they actually died. (Mhm) or that I was going to have ten dollars the next day and somehow I got ten dollars in my pocket. (Mhm). I don't particularly believe in that. I don't think it's true. I do feel, though, that there is such a thing as -- ah -- witchcraft. I do feel that in certain cultures there is such a thing as witchcraft, or some sort of science of witchcraft; I don't think that it's just a matter of believing hard enough that there is such a thing as witchcraft. I do believe that there is such a thing that a person can put himself in a state of mind (Mhm), or that -- er -- something could be given them to intoxicate them in a certain -- to a certain frame of mind -- that -- that could actually be considered witchcraft.[53]

In his book, Labov commends Larry for his conciseness and the syllogistic complexity of his thought. Although it is couched in non-standard English, Labov argues rightly that Larry's answer shows "verbal presence of mind." Labov has little use, however, for Charles' answer. He finds him verbose and "something less than a first-rate thinker."[54] He surmises that middle-class whites would prefer Charles' answer, though, because of "our long-conditioned reaction to middle-class verbosity."[55]

I must admit to having more sympathy for Charles than Labov has, chiefly because I, as a teacher, am aware of the process that he is going through in trying to express his ideas to an interviewer.

Let us look at the modes of thought attempted by both Larry and Charles. Larry (with much prompting) is forced to state his opinion of whether God is white or black. Formally, his argument might be constructed like this:

Major Premise: No Black God would treat Black people like shit.

Minor Premise: Black people are treated like shit.

Conclusion: If there's a God, he's not Black. [or -- No God is Black.]

Running implicitly parallel to that syllogism is another, implying that since God isn't black, he must be white, since whites have it good and blacks don't. This <u>does</u> involve complex reasoning, but that reasoning <u>isn't</u> spelled out by Larry. There are conjunctive devices ('Cause. . . And. . . So) to tie some of the sentences together, and repetition to supply lexical cohesion. But the <u>real</u> cohesion exists in the associative connections between the contrast of "whitey out there got everything" and "the nigger ain't got shit" and the connections between "shit" and "bull-shit." These <u>do</u> have impact. The argument moves laterally, from

"white [God]" to "whitey" to "nigger" and then to "black God."

When analyzing Charles' answer, on the other hand, Labov cites Charles' inability to get to the point, while ignoring the several false starts that Larry too experienced in answering his interviewer. Charles' "wordiness" stems from his effort to move back and forth between his particular exposure to ideas about dreams and witchcraft and his perceptions of various societies' attitudes toward witchcraft. He isn't very successful at this, but one can appreciate the effort. He begins by enumerating several specific incidents that might be construed as "witchcraft" -- how dreams might influence reality -- and he draws a conclusion about that ("I don't particularly believe in that."). Then he tries to see witchcraft on a larger scale (further generalizing) as the state of mind of a culture, and then moves associatively downward to address the state of mind of the individual who might believe in witchcraft. His transitions are clumsy and hard to follow because he somehow internally connects, for example, a "science of witchcraft" and a method for "putting [oneself] in a state of mind" for witchcraft. It's hard for a reader to see what that connection is.

As a teacher, I don't see Charles' clumsy effort as an attempt to appear "educated," as Labov does. I see it rather as an attempt to master some modes of thought (and cohesion) that his education had exposed him to. He had recognized that "witchcraft" affects individuals and also depends a great deal on the society that believes in it, and he was, through words, trying to connect those concepts in his answer to the interviewer. Just as many of our students, he wasn't particularly successful.

Larry's answer, on the other hand, was more charming, direct, and funny. It also represented a lateral movement in thought, a type of movement that, sooner or later, could prove limited. Charles' answer, while less concise, vivid and dramatic, was an effort to move his discourse in a variety of directions in an effort to explore an idea.

As teachers, we need to recognize such efforts and encourage them. We shouldn't let our "preferred" modes of thought color our opinions of those students who attempt discourse styles that are different from what they have been and what we have been familiar with. In the effort to adopt new perspectives, our students will struggle with the language that expresses those perspectives. And it's our job to provide the linguistic tools that will help them manipulate the language -- and their ideas -- to their own best advantage.

FOOTNOTES

[1]William Labov, Language in the Inner City (Philadelphia: University of Pennsylvania Press, 1972).

[2]Mina P. Shaughnessy, Errors and Expectations (New York: Oxford University Press, 1977).

[3]Janet Emig, The Composing Processes of Twelfth Graders, NCTE Research Report No. 13 (Urbana: National Council of Teachers of English, 1971).

[4]B.A. Bernstein, "A Sociolinguistic Approach to Socialization: with Some Reference to Educability," in F. Williams, ed., Language and Poverty (Chicago: Markham, 1970) pp. 25-61, cited by S. Glucksberg and J. H. Danks, Experimental Psycholinguistics: an Introduction (New York: John Wiley and Sons, 1975), pp. 165-66.

[5]Sam Glucksberg and Joseph H. Danks, Experimental Psycholinguistics: an Introduction (New York: John Wiley and Sons, 1975), p. 166.

[6]Michael Cole and Sylvia Scribner, Culture and Thought (New York: John Wiley and Sons, 1974) p. 193.

[7]Sayo Yotsukura,"Ethnolinguistic Introduction to Japanese Literature," in Language and Thought, Anthropological Issues, ed. W.C. McCormick and S. A. Wurm (The Hague: Mouton, 1977), p. 267.

[8]L.S. Vygotsky, Thought and Language, ed. and trans. Eugenia Hanfmann and Gertrude Vakar (Cambridge: MIT Press, 1962), p. 59.

[9]Ibid., p. 24

[10]Robin Lakoff, "If's, And's and But's about Conjunction," in Studies in Linguistic Semantics, ed. C.J. Fillmore and D.T. Langendoen (New York: Holt, Rinehart and Winston, 1971).

[11]Ray Jackendoff, "Grammar as Evidence for Conceptual Structure," in Linguistic Theory and Psychological Reality, eds. Morris Halle, Joan Bresnan and George A. Miller (Cambridge: MIT Press), p. 204.

[12]George A. Miller, "Semantic Relations among Words," in Linguistic Theory and Psychological Reality, eds. M. Halle, J. Bresnan, and G.A. Miller (Cambridge: MIT Press, 1978), p. 96.

[13]Wallace L. Chafe, "Discourse Structure and Human Knowledge," in Language Comprehension and the Acquisition of Knowledge, eds. John B. Carroll and Ray O. Freedle (Washington, D.C.: V.H. Winston and Sons, 1972) p. 45.

[14]Ibid., p. 50.

[15]Charlotte Linde and William Labov, "Spatial Networks as a Site for the Study of Language and Thought," Language 51 (December 1975), pp. 924-939.

[16]Ibid., p. 938.

[17]W. Kintsch and E.H. Kintsch, "The Role of Sch mata in Text Comprehension," International Journal of Psycholinguistics 5-2 no. 10 (1978), pp. 17-29.

[18]Ibid., p. 19.

[19]Benjamin Lee Whorf, Language Thought and Reality, ed. John B. Carroll (Cambridge: MIT Press, 1956).

[20]Cole and Scribner, pp. 40-56. See also Einer Haugen, "Linguistic Relativity: Myths and Methods," in Language and Thought: Anthropological Issues, eds. W.C. McCormack and S.A. Wurm (The Hague: Mouton, 1977), pp. 19-26.

[21]Cole and Scribner, p. 56.

[22]Whorf, p. 208.

[23]John H. Flavell, "Stage-related Properties of Cognitive Development," Cognitive Psychology 2 (1971), pp. 421-453.

[24]Andreas Demetriou and Anastasia Efklides, "Formal Operational Thinking in Young Adults as a Function of Education and Sex," International Journal of Psychology 14 (December 1979), pp. 241-253.

[25]A.R. Luria, Cognitive Development: Its Cultural and Social Foundations, trans. M. Lopez-Morillas and L. Solotaroff, ed. Michael Cole (Cambridge: Harvard University Press, 1976).

[26]Ibid., p. 8.

[27]Ibid., p. 59.

[28]Ibid., pp. 103-106.

[29]Ibid., pp. 120-132.

[30]Ibid., p. 44.

[31]David R. Olson, "Oral and Written Language and the Cognitive Processes of Children," Journal of Communication 27, no. 3 (1977), pp. 10-26.

[32]Ibid., p. 23.

[33]H.A. Witkin, C.A. Moore, D.R. Goodenough, P.W. Cox, "Field Dependent and Field-Independent Cognitive Styles and their Educational Implications," Review of Educational Research 47 (Winter 1977), p. 6.

[34]Manuel Ramirez III and Douglass R. Price-Williams, "Cognitive Styles of Children of Three Ethnic Groups in the U.S." Journal of Cross-Cultural Psychology 5 (June 1974), pp. 212-219.

[35]Luis M. Laosa and Edward A. DeAvila, "Development of Cognitive Styles among Chicanos in Traditional and Dualistic Communities," International Journal of Psychology 14 (June 1979), pp. 91-98.

[36]Lewis and Clark Research Grant, 1979-80, granted to Susan Hubbuch, Leslie Baxter, Marjorie Clark and Dale Holloway. Results unpublished.

[37]George N. Wright and Lawrence D. Phillips, "Cultural Variation in Probabilistic Thinking: Alternative Ways of Dealing with Uncertainty," International Journal of Psychology 15 (December 1980), pp. 239-257.

[38]Ibid., pp. 253-4.

[39]A.M. Bentley, "Pattern Reproduction in Two Cultures," International Journal of Psychology 15 (April 1980), pp. 1-9.

[40]Tom Ciborowski and Stephen Choy, "Nonstandard English and Free Recall," Journal of Cross-Cultural Psychology 5 (September 1974), pp. 271-281, and Rhonda S. Skupas and Ryan D. Tweney, "Race, Social Class, and Response Bias Effects in Grammatical Processing," Journal of Psycholinguistic Research 8 (January 1979), pp. 73-82.

[41]Marilyn Mathews and Lorene C. Quay, "Communication Accuracy in Lower- and Middle-SES Children as a Function of Task Abstraction," Journal of Psycholinguistic Research 9 (July 1980), pp. 349-354.

[42](London: Longman Group Ltd., 1976).

[43]Miller, pp. 60-118.

[44]Jerrold J. Katz, "Chomsky on Meaning," Language 56 (March 1980) pp. 1-40.

[45]Halliday and Hasan, p. 10.

[46]Bonnie Lynn Nash-Webber, Anaphora: A Cross Disciplinary Survey, Technical Report #31 (Urbana: Center for the Study of Reading and Bolt, Bernaek and Newman, Inc. [1977]), p. 3.

[47]Halliday and Hasan, p. 227.

[48]Halliday and Hasan, p. 274.

[49]Miller, pp. 76-77.

[50]Katz, pp. 1-40.

[51]Labov, p. 218.

[52]Labov, p. 217.

[53]Labov, p. 218 .

[54]Labov, p. 220

[55]Labov, p. 220.

COHESION IN ENGLISH:
A KEY TO THE WAY OUR CULTURE THINKS?

Dale W. Holloway
Writing Skills Center
Lewis & Clark College
Portland, Oregon

Conjunction--Types	Examples
1. Additional	and, so, in addition to, similar to, like, just like
2. Adversive	but, however, yet, in contrast, instead, even though, otherwise, still, on the contrary, on the other hand, although, unless, as opposed to, conversely
3. Cause-Effect	because, since, therefore, then, consequently, thus, as a result, so that, arising out of this, it follows
4. Emphasis	most importantly, the biggest advantage, the chief factor, the best thing, principally, most of all, valuable (to note), especially significant, remember that, a major concern, notable aspect, a key feature, actually
5. Specifizing	for example, for instance, specifically, as an illustration, with this in mind, in consequence, on account of this, in particular
6. Temporal	while, when, after, until before, whenever, then
7. Conditional	if (then), when, whenever, unless, as if, in that case, in such an event, under these circumstances
8. Summative	in conclusion, in summary, therefore, thus, as a result, to conclude, finally, a final reason, consequently, then

Dale W. Holloway
Writing Skills Center
Lewis & Clark College
Portland, Oregon

Lexical Cohesion--Types	Examples
9. Same item--repetition	The energy problems in the Northwest have not yet reached the proportions of those in other areas of the country. Hydroelectric power, which, until recently, was a relatively inexpensive source of energy, has served a large percentage of the population.
10. Synonym or near synonym (including hyponyms)	The concept of solar power is not new. Leonardo da Vinci toyed with the idea centuries ago in his notebooks.
11. Superordinate	Chairs, tables, couches, and lamps cluttered the entire room. Winding her way through the masses of furniture, Nancy Drew sought the old clock.
12. "General" item (Often consists of "the" or "this" + NP)	Rising rates for mass transit are making it difficult for the poor to have the mobility that they need in a large city. The local government seems to be doing little to alleviate this problem.
13. Collocation	The large, milling crowd moved like an angry ocean below him. At first it seemed to undulate with small, intense ripples of movement, but as he neared the end of his ill-fated speech, it seemed to swell, then gather into an enormous, deafening wave of anger and frustration that hung suspended for a moment and then crashed forward, spreading in rushing waves across the courtyard.

Category of Cohesion	Movement	Types of Conjunctive Devices	Types of Lexical Cohesion
Experiential	lateral: event → event	additional temporal emphasis cause-effect	repetition synonyms "general" items collocation
Associative	all directions ↑ ← event → ↓ ↑ ← thought →	temporal, additional } chiefly and all other types	collocation } chiefly repetition synonyms "general" items
Generalizing	lateral concepts → concepts	cause-effect, temporal } chiefly and all others except specifying	"general" items superordinates repetition and all others
Inductive	upward general particular ↗	specifizing summative and all others	hyponyms superordinates and all others
Deductive	downward general ↘ particular	summative specifizing and all others	superordinates hyponyms and all others

BIBLIOGRAPHY

Aaronson, Davis and Robert Rieber. Psycholinguistic Research: Implications and Applications. New York: John Wiley & Sons, 1979.

Bentley, A.M. "Pattern Reproduction in Two Cultures." International Journal of Psychology 15 (April 1980): 1-9.

Bentley, Robert H. and Samuel D. Crawford. Black Language Reader. Glenview: Scott, Foresman & Company, 1973.

Bresson, Francois "Semantics, Syntax & Utterance: Determining a Referent." International Journal of Psycholinguistics 4:2(8) (1977): 31-41.

Chafe, Wallace L. "Discourse Structure and Human Knowledge." In Language Comprehension and the Acquisition of Knowledge, pp. 41-69. Edited by John B. Carroll and Ray O. Freedle. Washington, D.C.: V.H. Winston and Sons, 1972.

Chiu, Lian-Hwang. "A Cross-Cultural Comparison of Cognitive Styles in Chinese and American Children." International Journal of Psychology 7, No. 4 (1972): 235-242.

Ciborowski, Tom and Stephen Choy. "Nonstandard English and Free Recall." Journal of Cross-Cultural Psychology 5, No. 3 (September 1974): 271-281.

Cole, Michael, and Sylvia Schribner. Culture and Thought. New York: John Wiley & Sons, Inc., 1974.

Demetriou, Andreas and Anastasea Efklides. "Formal Operational Thinking in Young Adults as a Function of Education and Sex." International Journal of Psychology 14 (December 1979): 241-253.

Emig, Janet. The Composing Processes of Twelfth Graders. NCTE Research Report no. 13. Urbana: National Council of Teachers of English, 1971.

Flavell, John H. "Stage-related Properties of Cognitive Develppment." Cognitive Psychology 2 (1971): 421-453.

Glucksberg, Sam and Joseph H. Danks. Experimental Psycholinguistics: an Introduction. New York: John Wiley & Sons, 1975.

Halliday, M.A.K. and Ruqaiya Hasan. Cohesion in English. London: Longman Group Limited, 1976.

Haugen, Einar. "Linguistic Relativity: Myths and Methods." In Language and Thought. Anthropological Issues. pp. 11-28. The Hague: Mouton, 1977.

Jackendoff, Ray "Toward a Cognitively Viable Semantics." In Semantics: Theory and Application. pp. 59-80. Edited by Clea Rameh. Washington, D.C.: Georgetown University Press, 1976.

Jackendoff, Ray. "Grammar as Evidence for Conceptual Structure." In Linguistic Theory and Psychological Reality. pp. 201-228. Edited by Morris Halle, Joan Bresnan and George A. Miller. Cambridge: The MIT Press, 1978.

Katz, Jerrold J. "Chomsky on Meaning." Language 56, no. 1 (March 1980): 113-125.

Kintsch, W. and E.H. Kintsch. "The Role of Schemata in Text Comprehension." International Journal of Psycholinguistics 5, no. 2 (1978): 17-29.

Labov, William. Language in the Inner City. Philadelphia: University of Pennsylvania Press, 1972.

Lakoff, Robin. "If's, And's & But's about Conjunction." In Studies in Linguistic Semantics, Edited by C.J. Fillmore and D.T. Langendoen. New York: Holt, Rinehart & Winston, Inc., 1971.

Laosa, Luis M. and Edward A. DeAvila. "Development of Cognitive Styles among Chicanos in Traditional and Dualistic Communities." International Journal of Psychology 14 (June 1979): 91-98.

Liben, Lynn S. and Carla J. Posnansky. "Inferences on Inference: The Effects of Age, Transitive Ability, Memory Load, and Lexical Factors." Child Development 48 (1977): 1490-1497.

Linde, Charlotte and William Labov. "Spatial Networks as a Site for the Study of Language and Thought." Language 51, No. 4 (December 1975): 924-939.

Luria, A.R. Cognitive Development: Its Cultural and Social Foundations. Trans. by M. Lopez-Morillas and L. Solotaroff. Edited by Michael Cole. Cambridge: Harvard University Press, 1976.

Mathews, Marilyn and Lorene C. Quay. "Communication Accuracy in Lower and Middle - SES Children as a Function of Task Abstraction." Journal of Psycholinguistic Research 9, No. 4 (July 1980): 349-354.

Miller, George A. "Semantic Relations Among Words." In Linguistic Theory and Psychological Reality. pp. 60-118. Edited by Morris Halle, Joan Bresnan and George A. Miller. Cambridge: MIT Press, 1978.

Nash-Webber, Bonnie Lynn. Anaphora: A Cross Disciplinary Survey. Technical Report No. 31. Urbana: Center for the Study of Reading and Bolt, Beranek and Newman, Inc., 1977.

Olson, David R. "Oral and Written Language and the Cognitive Processes of Children." Journal of Communication 27, No. 3 (1977): 10-26.

Ramirez III, Manuel and Douglass R. Price-Williams. "Cognitive Styles of Children of Three Ethnic Groups in the U.S." Journal of Cross-Cultural Psychology 5, No. 2 (June 1974): 212-219.

Shaughnessy, Mina. Errors and Expectations. New York: Oxford University Press, 1977.

Skupas, Rhonda S. and Ryan D. Tweney. "Race, Social Class, and Response Bias Effects in Grammatical Processing." Journal of Psycholinguistic Research 8, No.1 (January 1979): 73-82.

Vygotsky, L.S. Thought and Language. Edited and Translated by Eugenid Haufmann and Gertrude Vakar. Cambridge: The MIT Press, 1962.

Whorf, Benjamin Lee. Language Thought and Reality. Edited by John B. Carroll. Cambridge: The MIT Press, 1956.

Witkin, H.A., C.A. Moore, D.R. Goodenough and P.W. Cox. "Field-Dependent and Field-Independent Cognitive Styles and Their Educational Implications." Review of Educational Research 47, No. 1 (Winter 1977): 1-64.

Wright, George N. and Lawrence D. Phillips. "Cultural Variation in Probabilistic Thinking: Alternative Ways of Dealing with Uncertainty." International Journal of Psychology 15 (December 1980): 239-257.

Yotsukura, Sayo. "Ethnolinguistic Introduction to Japanese Literature." In Language and Thought, Anthropological Issues. pp. 261-270. Edited by William C. McCormack and Stephen A. Wurm. The Hague : Mouton Publishers, 1977.

Some suggestions for teaching cohesion:

1. Guided sentence combining and sentence imitation.

   Examples:

   Combine --

   a. The ravages of erosion are not combated. (Conditional) Vast areas are left barren and whole nations without usable land.

   Imitate this sentence structure --

   b. If _____ _____ _____, _____ _____

   could be _____ and _____.

2. Small group work on unguided sentence-combining -- students discuss alternative ways to combine sentences and defend their interpretations.

3. Class discussions and close study of short essays that demonstrate various cohesive styles.

4. Board work with selected sentences from students' papers. The class should try to determine what ideas the sample sentences were meant to convey, why they didn't convey it, and how to make them so they will be effective and cohesive.

5. Exercises in categorizing.

(over)

Sample exercise:

You're interested in writing about the elderly, and you brainstorm the items listed below. How would you organize them into categories? What titles for the categories can you come up with?

The Elderly

poor nutrition
retirement communities
health
fixed incomes
the "extended" family
fear of dependency
loneliness
visiting nurses
meals on wheels
rest homes
crimes against the elderly
cooperative housing for the elderly

[Note: there is probably no single "correct" system for arranging and focusing these categories. When you and the class discuss their choices, they will see that there are a variety of ways to organize and connect their ideas, all of them valid as long as they are consistent and communicatable.]